Environmental

Educating Washington residents, about exposures to toxic chemicals released into the environment, for a healthier tomorrow.

Health

Cenex Supply & Marketing Facility-Quincy, WA

HEALTH CONSULTATION FINDINGS

Location

The Cenex facility is south

of the Burlington Northern

Division Street, between 4th

railroad tracks, north of

and 6th Avenues.

What is DOH Doing at Cenex?

In 1997, the Department of Ecology asked the Department of Health (DOH) to prepare a Health Consultation for the Cenex Supply and Marketing facility in Quincy, Washington. A Health Consultation evaluates environmental data to determine if

contamination at a hazardous waste site is impacting public health or might in the future. This fact sheet is a summary of the Health Consultation findings and conclusions.

Site History

The Cenex facility was used for many years to store and distribute fertilizer and fumigant products. Prior to Cenex owning the facility, there was an unreported fumigant spill which was never cleaned up. As a result, the groundwater beneath the facility is contaminated. Routine handling of herbicides and pesticides also resulted in low-level soil contamination. Cenex has been working closely with Ecology to identify and clean up contamination since 1991. Cenex has already conducted some cleanup and is currently developing the final cleanup plan.

Sampling Results

Samples of soil, groundwater, soil gas, and air have been collected. They were tested for site-related pesticides, fumigants, metals, volatile organic compounds, nitrates,

and ammonia. Contaminants were found in groundwater, soil, and subsurface soil gases.

The highest concentrations of herbicides and pesticides in the soil were found next to the former rinsate pond. The following chemicals were found in the soil at levels that exceeded public health agency screen-

ing values:

Chlorpyrifos-insecticide
Disulfoton-insecticide
Ethalfluralin-herbicide
Trifluralin-herbicide

Vernolate-herbicide Chromium-metal Beryllium-metal Cadmium-metal

DOH conducted a detailed evaluation of each of these chemicals. Assuming exposure to the highest detected concentrations of these chemicals, DOH determined that adverse human health effects are not likely.

Public Health Impacts

SOIL

Contaminants in on-site soil were not at levels expected to cause adverse health effects. In most cases, the highest concentrations of chemicals were several feet underground, where exposure is not likely to occur. Two previously excavated soil piles, containing the highest levels of contamination at the site, were disposed of at a licensed waste facility in June 1997.

Soil Gas

Volatile organic compounds (VOCs) in on-site

subsurface soil gas could pose a health risk for persons exposed long-term to the highest concentrations found. However, the concentrations were eight feet underground, so exposure is unlikely.

GROUNDWATER

Exposure to the shallow groundwater containing the highest concentrations of VOCs would pose a health risk for persons exposed long-term. However, records do not show any active residential drinking water wells near the facility. Nearby residents receive their water from the city. The city's wells, accessed from a deeper groundwater source, have not been impacted by the contaminants found in the shallow groundwater. No VOCs were found when the city of Quincy tested municipal well 5, a downgradient well, in June.

AIR

In February 1998, 11 air samples were collected in and near the Quincy High School to determine whether 1,2-dichloropropane (1,2-DCP) was present at levels of health concern. Only one of the samples collected from the high school staff lounge detected 1,2-DCP. The concentration was below a level of health concern and does not pose a health threat.

DOH Recommendations

Based on the conclusions of the Health Consultation, DOH recommends the following actions:

- ◆ Cenex should continue to provide DOH with all sampling results for evaluation.
- ◆ The City of Quincy should test quarterly for VOCs in municipal well 5 for at least one year, and test for pesticides in wells 4 and 5 for at least six months.
- Cenex should install a deep monitoring well to determine if VOCs have reached the deeper groundwater source and are migrating off site.
- ◆ DOH should be notified if private wells are found downgradient of the site.
- Indoor air samples should be conducted at the adjacent potato warehouse by Cenex or the warehouse owner to assure that VOCs are not present at levels of health concern.
- If excavation is performed at the site, respiratory protection should be utilized by Cenex employees, and other workers who could be exposed to elevated levels of VOCs in subsurface soil gas.

Future Activities

The Health Consultation is now being converted to a more detailed Public Health Assessment. Before it is final, the community will have an opportunity to comment on the draft Public Health Assessment.

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